

Listing of the Claims

1. - 33. (Cancelled)
34. (Currently amended) A method according to claim ~~33~~ 39 wherein the polymer is a glass-reinforced plastics material.
35. (Currently amended) A method according to claim ~~35~~ 39 wherein the faces of peripheral edge regions of the support frame over which woven cloth overlies and to which the cloth is to be bonded by heating are formed during manufacture with a plurality of substantially parallel ridges, the ridges being susceptible to soften on heating to bond onto the cloth laid thereover so that the cloth penetrates and becomes embedded in softened crests of the ridges.
36. (Original) A method according to claim 36, in which said edge regions include an outer peripheral flange surrounding a central region occupied by an integral matrix of interconnecting struts, the flange and struts are formed with ridges where they engage the wirecloths, and the ridges extend to different heights so that corresponding crests of the ridges lie in different parallel planes.
37. (Currently amended) A method according claim ~~33~~ 39 wherein spacers are located within the wire frame assembly, each attached to one or other of the arrays of reinforcing wires so as to extend towards the other, whereby any tendency for the arrays to collapse

inwards during moulding, is resisted by the spacers.

39. (Currently amended) ~~A method according to claim 34 wherein~~ A method of constructing a polymer support frame over which woven wire cloth is to be stretched and secured to form a sifting screen, the method comprising the steps of:

- (a) locating in a mould tool a reinforcing wire frame assembly comprising two parallel spaced apart arrays of reinforcing wires;
- (b) closing the mould tool;
- (c) injecting liquid polymer into the mould tool by injection moulding so as to wholly encapsulate the wire frame and to form an article having an open central region criss-crossed by intersecting orthogonal ribs bounded on all sides by a rigid flange, the article being such that each of said ribs includes two parallel spaced apart wires of said frame assembly;
- (d) exerting an inward force on opposite faces of the wire frame assembly within the mould tool by fingers protruding inwardly from inside faces of the tool, said fingers being operable to engage the arrays when the tool closes, the fingers comprise comprising inwardly projecting pegs which align with crossing points of wires in the upper and lower reinforcing matrices, to space the matrices arrays from the corresponding upper and lower internal surfaces of the mould tool and ensure that the matrices arrays are buried within the plastics material which is injected into the mould tool during the manufacturing process, and the ends of the pegs taper to an edge, or a point,

and wherein after the mould tool is opened the protruding pegs disengage from the struts leaving openings in the polymer, and the method further comprises the step of plugging the openings with plastics material or filler,

- (e) permitting the polymer to cure; and
- (f) opening the tool; and removing the article.

40. (Currently amended) A method according to claim 33 39 wherein the wire frame assembly is supported within the ~~tooling~~ mould tool by means of retractable pins which protrude through the tooling wall to engage the assembly and accurately locate it within the ~~tooling~~ mould tool, and the pins are retracted as the ~~tooling~~ mould tool opens after the moulding step has been completed.

41. (Original) A method according to claim 40 wherein the pins align with protruding ends of wires making up the wire frame assembly and are separably joined to the ends of the wires by means of sleeves of plastics material which is compatible with or the same as the polymer used to form the support frame, and opposite ends of the sleeves receive the pins and the reinforcing wire ends respectively, and wherein the passage through each sleeve is blocked so as to form two coaxial blind bores, each sleeve becomes embedded in the polymer during moulding and remains in the polymer as the pin which engages it is retracted as the tooling is opened, the blocked passage serving to encapsulate the end of the wire end located in the inner end of the sleeve.

42. (Original) A method according to claim 41 wherein prior to moulding the tool is fitted

with the pegs, and the pegs become integrally bonded to the polymer material during moulding so that when the tool is opened, the pegs separate from the tool, and remain in the polymer support frame, and portions of each peg protruding from the support frame are removed by grinding or filing or cutting.

43. (new) A method of constructing a polymer support frame over which woven wire cloth is to be stretched and secured to form a sifting screen, the method comprising the steps of:

- (a) locating in a mould tool a reinforcing wire frame assembly comprising two parallel spaced apart arrays of reinforcing wires;
- (b) closing the mould tool;
- (c) injecting liquid polymer into the mould tool by injection moulding so as to wholly encapsulate the wire frame and to form an article having an open central region criss-crossed by intersecting orthogonal ribs bounded on all sides by a rigid flange, the article being such that each of said ribs includes two parallel spaced apart wires of said frame assembly;
- (d) supporting the wire frame assembly within the mould tool by means of retractable pins which protrude through the tooling wall to engage the assembly and accurately locate it within the mould tool, and the pins are retracted as the mould tool opens after the moulding step has been completed permitting the polymer to cure; and
- (e) opening the tool; and removing the article.

44. (New) A method according to claim 43, wherein an inward force is exerted on opposite faces of the wire frame assembly within the mould tool by fingers protruding inwardly from inside faces of the tool, said fingers being operable to engage the arrays when the tool closes.
45. (New) A method according to claim 43 wherein the polymer is a glass-reinforced plastics material.
46. (New) A method according to claim 43 wherein the faces of peripheral edge regions of the support frame over which woven cloth overlies and to which the cloth is to be bonded by heating are formed during manufacture with a plurality of substantially parallel ridges, the ridges being susceptible to soften on heating to bond onto the cloth laid thereover so that the cloth penetrates and becomes embedded in softened crests of the ridges.
47. (New) A method according to claim 46, in which said edge regions include an outer peripheral flange surrounding a central region occupied by an integral matrix of interconnecting struts, the flange and struts are formed with ridges where they engage the wirecloths, and the ridges extend to different heights so that corresponding crests of the ridges lie in different parallel planes.
48. (New) A method according claim 43 wherein spacers are located within the wire frame assembly, each attached to one or other of the arrays of reinforcing wires so as to extend

towards the other, whereby any tendency for the arrays to collapse inwards during moulding, is resisted by the spacers.

49. (New) A method according to claim 34 wherein the fingers comprise inwardly projecting pegs which align with crossing points of wires in the upper and lower reinforcing arrays, to space the matrices from the corresponding upper and lower internal surfaces of the mould tool and ensure that the arrays are buried within the plastics material which is injected into the mould tool during the manufacturing process, and the ends of the pegs taper to an edge, or a point, and wherein after the mould tool is opened the protruding pegs disengage from the struts leaving openings in the polymer, and the method further comprises the step of plugging the openings with plastics material or filler.

50. (New) A method according to claim 43 wherein prior to moulding the tool is fitted with the pegs, and the pegs become integrally bonded to the polymer material during moulding so that when the tool is opened, the pegs separate from the tool, and remain in the polymer support frame, and portions of each peg protruding from the support frame are removed by grinding or filing or cutting.